Matter of: Hercules Aerospace Company

File: B-254577

Date: January 10, 1994

Frank M. Rapoport, Esq., Richard W. Foltz, Jr., Esq., and Ari Goldberger, Esq., Pepper, Hamilton & Sheetz, for the protester.

Richard K. Shimabukuro, Esq., for Thiokol Corporation, an interested party.

Charles J. McManus, Esq., Department of the Navy, for the agency.

Peter A. Iannicelli, Esq., and Linda C. Glass, Esq., Office of the General Counsel, GAO, participated in the preparation of the decision.

DIGEST

Agency properly made a noncompetitive modification to the contract of its current, active mobilization base producer where: (1) protester and its competitor have been the only qualified industrial mobilization base suppliers of rocket motors for several years; (2) one of protester's motors exploded during acceptance testing and agency reasonably determined after investigating that protester must make major manufacturing process changes and complete requalification testing before agency would accept any more rocket motors from protester; and (3) a critical shortage of rocket motors existed as a result of protester's motor exploding.

DECISION

Hercules Aerospace Company protests the Department of the Navy's modification of contract No. N00019-91-C-0111, with Thiokol Corporation to purchase 271 additional rocket motors and engineering analysis of previously manufactured rocket motors for use in the AGM-88 high-speed anti-radiation missile. Hercules contends that the modification was an improper award of a contract to Thiokol on a sole-source

basis. Hercules asserts that it should have been allowed to compete for this contract because it can provide the rocket motors and engineering services on a timely basis.

We deny the protest.

The high-speed anti-radiation missile is a joint service tactical air-launched missile used by the Navy, Air Force, Marines, and several foreign military sales customers. The missile is designed to destroy and suppress enemy radar sites, particularly sites used to direct anti-aircraft guns and surface-to-air missiles. It is one of the first weapons used in wartime and is critical in allowing friendly air forces to operate over enemy territory. The rocket motors propel the missiles at launch from the aircraft. The motors are purchased by the government, and then provided to Texas Instruments, the prime missile contractor, as government furnished property for incorporation into the missiles.

Fiscal year 1987 through 1991 requirements for rocket motors were acquired from both Hercules and Thiokol as part of the industrial mobilization base program. In 1991, contracts for supplying rocket motors were awarded to both Hercules and Thiokol. After conducting a limited competition between the two firms, the Navy modified Hercules's contract in December 1991 to increase the number of motors to be delivered and include options for fiscal year 1993 and 1994 requirements. In January 1992, the Navy exercised its option with Hercules for 1,330 additional motors.

In August 1992, one of Hercules's rocket motors exploded during lot acceptance testing and the Navy refused to accept any more motors from Hercules until the failure could be analyzed, the cause of the problem identified, and corrections made. Hercules shut down its production line while both it and the Navy conducted investigations. The investigations revealed that many of Hercules's motors, including motors that had been previously accepted by the Navy, were defective. Accordingly, the Navy grounded

Hercules initially argued that the Navy improperly did not synopsize the solicitation in the <u>Commerce Business Daily</u> (CBD). Citing <u>Electro-Methods</u>, <u>Inc.</u>, B-250931, Feb. 26, 1993, 93-1 CPD ¶ 181, the Navy responded that, since there was an unusual and compelling urgency for the motors, it was not required to synopsize the proposed modification in the CBD. Hercules did not address this issue in its comments on the agency's report, and therefore, we consider this ground of protest abandoned. <u>See Heimann Sys. Co.</u>, B-238882, June 1, 1990, 90-1 CPD ¶ 520.

5,100 previously accepted Hercules motors to prevent their use in missiles that would be deployed on military aircraft until they could be examined for defects.

As a result of these actions, a shortage of deployable missiles developed. The Navy planned to award a contract in April 1994, on a competitive basis for 846 rocket motors with an option for 1,000 additional motors. However, the Navy found that in the interim, there was an immediate and critical shortfall of deployable missiles that would affect national defense capabilities. Consequently, on August 9, 1993, a document entitled "Justification and Approval for Other Than Full and Open Competition" supporting modification of Thiokol's existing contract to add 271 rocket motors and engineering investigation of motors already produced by Hercules on the basis of "unusual and compelling urgency" was approved. Thiokol's contract was modified on August 18, and Hercules filed its protest with our Office on August 27.

The main point of Hercules's protest is that the Navy could not properly justify awarding a contract for rocket motors and engineering analysis to Thiokol on a sole-source basis. Hercules argues that, regardless of the fact that the contract action was labeled as a modification of Thiokol's contract, the Navy's action was a <u>de facto</u> sole-source procurement because Hercules was precluded from consideration for award and no other sources were considered. Hercules contends that, since it is one of two mobilization base suppliers of the rocket motors, it also could fulfill the Navy's urgent requirement for the motors and engineering services in a timely manner.

The Competition in Contracting Act of 1984 (CICA) provides for the use of noncompetitive procedures where the agency's need for the property or services is of such an unusual and compelling urgency that the United States would be seriously injured unless the agency is permitted to limit the number of sources from which it solicits proposals. 10 U.S.C. § 2304(c)(2) (1988). While CICA requires that the agency request offers from "as many potential sources as is practicable under the circumstances," 10 U.S.C. § 2304(e), an agency may still limit the procurement to the only firm it reasonably believes can properly perform the work in the available time, provided this limitation is justified. See Electro-Methods, Inc., supra; Environmental Tectonics Corp., B-248611, Sept. 8, 1992, 92-2 CPD ¶ 160.

The record shows that Hercules was required to deliver 3,975 rocket motors to the Navy for installation in the AGM-88 high-speed anti-radiation missile under the contract

awarded to it in March 1991. As of August 26, 1992, the date of the explosion, Hercules was delinquent in delivery of 63 rocket motors. One year later, on August 18, 1993, when the Navy modified Thiokol's contract, Hercules was delinquent in delivery of approximately 2,000 units. Also, at the time the modification was effected, Hercules had not yet completed all requalification testing and, therefore, was not considered a qualified source. In this regard, the Navy reports that even if Hercules had been requalified by then, the firm would have been about 1 year behind schedule in delivering rocket motors because of delays related to investigating the explosion, changing the manufacturing processes, and requalifying. The Navy also reports that, if the rocket motors and engineering analysis were not procured in August 1993, aircraft would have to be deployed without the missiles and their defense suppression capabilities. this regard, the Navy's August 9, 1993, justification and approval stated that there was an unusual and compelling urgency for the supplies and further stated:

"This procurement is essential and is needed immediately so as not to impair air defense and air combat missions. Asset readiness is already extremely low and falling. Therefore, it is imperative that the Government issue a contract to Thiokol Corporation."

We believe the Navy acted properly. Hercules was delinquent in making deliveries under its contract (or, as the protester contends, the Navy refused to accept deliveries). Moreover, as discussed below, the Navy reasonably suspected that a large portion of the 5,100 motors previously delivered by Hercules might have defects similar to those uncovered in the investigation. In light of the resulting shortage, and because Hercules had not yet been requalified in August 1993 and because (the Navy reports) it would take new sources at least 1 year to qualify, the Navy's decision to procure its immediate needs for the rocket motors by modifying the contract of the only qualified contractor, Thiokol, under authority of 10 U.S.C. § 2304(c)(2) due to the unusual and compelling urgency of its requirement was

The basic contract required Hercules to deliver 522 units; this contract was modified in December 1991, to increase the amount by 2,123 units to meet needs of Operation Desert Storm; an option for 1,330 additional units was exercised by the Navy in January 1992.

In support of its finding of urgency, the Navy submitted a statement of inventory; the document is labeled "Confidential/National Security Information" and, therefore, will be discussed no further.

reasonable. See Electro-Methods, Inc., supra, and cases cited.

The protester contends that the Navy overreacted to the explosion. Hercules states that more than 1,000 Hercules motors were fired during Operation Desert Storm without a single failure. Hercules also contends that the Navy's estimate of a 25-percent defect rate for motors previously delivered is a gross exaggeration and asserts that the actual defect rate is only 13.91 percent. In addition, Hercules argues that the agency has incorrectly concluded that the probable cause of the motor exploding was a bondline defect, Hercules points out that the motor that exploded was not typical of the motors that Hercules would be delivering, because the tested motor used a case that had been fired twice previously. The case was badly corroded and pitted, and the protester believes that the corrosion was, in actuality, the likely cause of the explosion.

We see nothing unreasonable with the Navy's decision not to accept rocket motors from Hercules until the cause of the explosion is determined and a remedy devised. The explosion was catastrophic, destroying not only the rocket motor but engulfing the test facility in flames as well, and since the rocket motors are used in missiles launched from military aircraft, any defects, particularly bondline defects, would put the aircraft and persons aboard them in jeopardy. the circumstances, we think the Navy, suspecting that a large portion of rocket motors previously purchased from Hercules might have defects, reasonably decided to ground all previously acquired Hercules motors until they could be inspected using a screening technique that is more accurate than the technique previously used. We note in this regard that Hercules's own engineering investigation concluded that previously delivered motors might contain defects.

The Navy explains that, in a motor meeting all specifications, the propellant/liner/insulation/case interface is completely bonded with no separations between the individual components. The Navy uses the term "unbond" or "liner separation" to represent a bonding failure between the propellant and liner. The Navy further explains that the propellant is supposed to burn from the inside of the motor towards the outside at a given rate for a given area in a controlled motor burn. However, unbonds and liner separations represent extra burning surface which can cause over-pressurization of the case and lead to an explosion such as that which occurred during testing.

Regarding the estimates of previously purchased motors that might contain defects, the Navy reports that its 25 percent estimate is based upon a test sample of approximately 500 previously delivered Hercules motors. Using the Navy's figure, it can be expected that approximately 1,275 out of the 5,100 previously accepted motors are defective and will require replacement. Using Hercules's 13.91 percent figure, an estimated 714 rocket motors are defective. Thus, even under Hercules's estimate, a substantial number of motors are likely defective.

Hercules's assertion that corrosion, rather than a manufacturing defect, was the probable cause of the explosion of its rocket motor is not persuasive. Following the explosion. Hercules inspected 280 motors and found that approximately 12.5 percent (35 motors) were defective in several different ways, including at least 17 units that contained bondline defects. After conducting its own investigation and being briefed by Hercules on the firm's engineering analysis, the Navy concluded that bondline defects (including liner separations and unbonds) were the probable cause of the explosion. Since the rocket motor was destroyed when it exploded, no one can be sure whether one defect or the other was the primary cause of the explosion. However, since Hercules's own investigation revealed that a large number of rocket motors did contain bondline defects, and the Navy has explained that such defects can cause a motor to explode, the Navy's concern clearly is rationally based.

Hercules next alleges that when Thiokol's contract was modified in August 1993 its status as a qualified offeror had lapsed because Thiokol had last delivered rocket motors to the Navy more than 12 months before the contract modification was effected. The record shows, however, that on August 4, 1993, the Navy extended Thiokol's status as a qualified source for an additional 6-month period. This allegation therefore is meritless.

Finally, Hercules alleges that the Navy improperly modified Thiokol's contract to settle a monetary claim Thiokol had filed with the Armed Services Board of Contract Appeals. The Navy categorically denies the charge.

Where a protester initially files a timely protest and later supplements it with new and independent bases for protest, the later raised allegations must independently satisfy the timeliness requirements of our Bid Protest Regulations,

⁵A motion for partial summary judgment was granted in <u>Appeal of Thiokol Corp. Strategic Operations Under Contract No. N00019-91-C-0111</u>, ASBCA No. 45,348, June 24, 1993, 1993 WL 243147.

since our Regulations do not contemplate the unwarranted piecemeal presentation or development of protest issues. AT&T, B-251177; B-251177.2, Mar. 16, 1993, 93-1 CPD ¶ 236. Under our Regulations, 4 C.F.R. § 21.2(a)(2), Hercules had to file this protest issue not later than 10 days after it knew, or should have known, of these grounds for protest.

Hercules referred to the litigation between the Navy and Thickol as part of the "Statement of Facts" set out in its initial protest, but did not raise it as a protest issue. Then, in its comments on the agency's report on its protest, Hercules alleged for the first time its belief that the 271-motor purchase from Thiokol under the contract modification was really an improper settlement of Thiokol's claim for an equitable adjustment due to Thiokol's advance purchase of component parts for nearly 300 motors in anticipation of a contract award that it never obtained. since Hercules knew all of the facts at the time of its initial protest filing (August 27, 1993) but did not raise this as an issue until it filed its comments on October 21. the issue is untimely. In any event, in view of our finding that the Navy properly justified its modification of Thiokol's contract on the basis of unusual and compelling urgency, this allegation provides no basis for sustaining the protest.

We deny the protest.

Robert P. Murphy Acting General Counsel